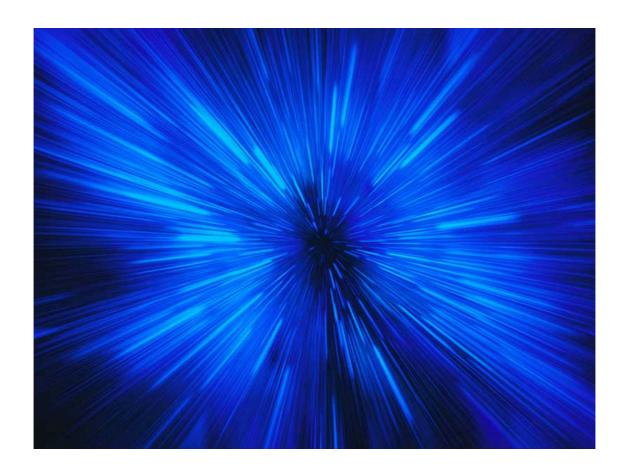


STATE OF VERMONT

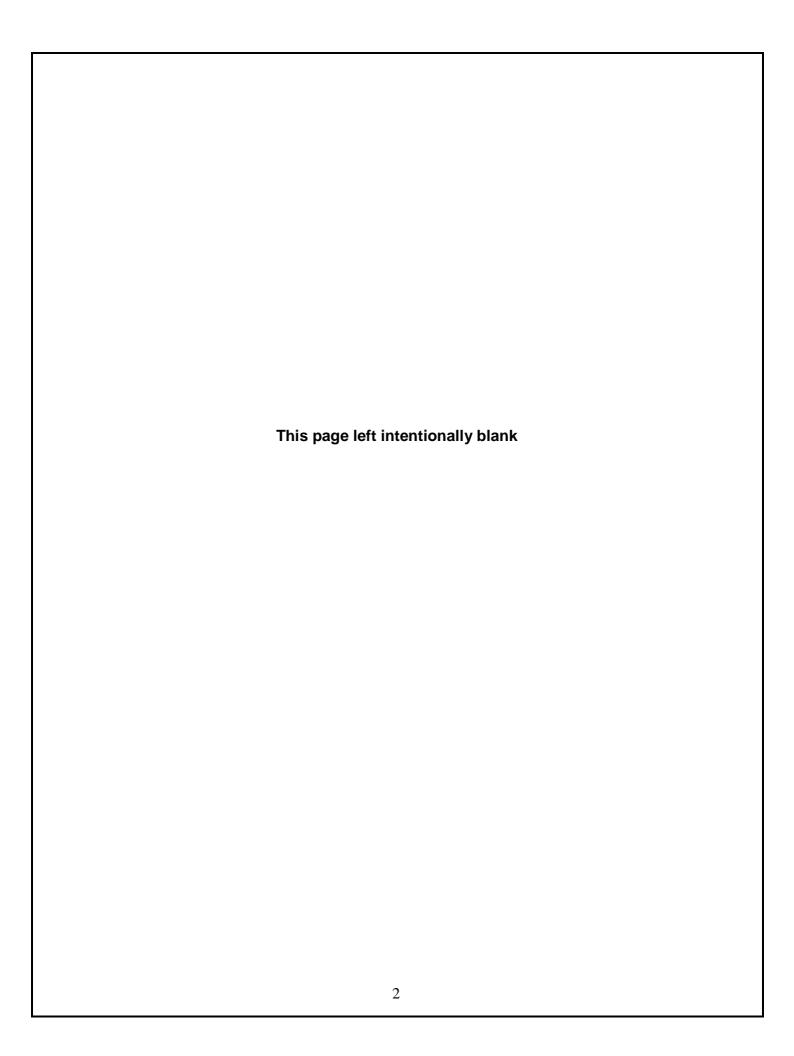
Information Technology Strategic Plan



CHARTING THE COURSE TOWARD VERMONT STATE GOVERNMENT'S INFORMATION TECHNOLOGY FUTURE

FY 2007 - 2011

January 2006





State of Vermont Office of the Secretary of Administration 109 State Street Montpelier, VT 05663-0210 Charles P. Smith, Secretary of Administration

Message from the Secretary of Administration

Welcome:

The importance to Vermont state government of sound and strategic investment in information technology is hard to overstate. Technology will provide the tools to transform the delivery of services by state government over the next decade. During the past year, I have reviewed how information services and projects are planned, organized, prioritized, funded and tracked. In particular, I have reviewed the role of the Department of Information and Innovation (DII), which was created in 2003 to centralize IT processes and spending.

While centralization of all staff and support functions present many difficulties, it is perfectly clear that there must be one department with the organizational power to play a central and guiding role with information services. That department is DII, and the role requires establishing a strategic plan, attached herewith, on which future technology investments will be based. DII's role also includes responsibility for developing and managing the systems that serve the whole state government enterprise, and accountability for the successful development of major department and agency technology projects.

This plan illustrates the commitment of my office, DII, and agencies and departments across state government to move forward with an enterprise approach to information services. DII will work closely with the various units of state government to ensure that their IT systems and investments follow best practices. Where enterprise approaches are called for, DII will provide authoritative leadership to develop, maintain and improve IT solutions.

As DII gains strength as the central IT management authority, it will oversee IT infrastructure, system development and particularly IT enterprise solutions. It will be important to ensure that DII has sufficient staffing and funding resources to accomplish these critical functions. At the same time, I recognize the necessity for agencies and departments to maintain their own capacity to support internal IT equipment, unique applications and legacy systems.

In closing, I want to acknowledge and thank DII Commissioner and Chief Information Officer Denise Fehr and her team for the development of this plan. Clear direction, leadership and collaboration will be the key to success. The Information Technology Strategic Plan sets a clear vision and direction for the State's IT future, recognizing that IT is the means, not the end, to improved, efficient and effectively delivered government services to Vermonters.

Charles P. Smith Secretary of Administration





State of Vermont Office of the CIO 133 State Street Montpelier, VT 05663-0210 Denise L. Fehr, Chief Information Officer

Message from the Chief Information Officer (CIO)

Greetings:

Technology is a means to an end, not an end in itself.

What is the end? Easy access to government services for *all* Vermonters. Easy access for individuals who want to renew their driver's licenses or for Vermonters in need who depend on government services. Real-time information for small businesses that need to file an annual report or for taxpayers wishing to save time and money with online filing. With the help of world-class technology, it is the administration's goal to make these and many other services available to all Vermonters with the simple click of a mouse and a computer, while increasing efficiency and saving taxpayer dollars.

With this in mind and with the help and suggestions of countless individuals inside state government, it is my privilege to present an information technology plan that details comprehensive goals and a detailed strategy to make this vision a reality.

This plan charts a course for the future by which the State of Vermont can provide citizens with the tools to make their lives easier. It is our goal to establish seamless solutions for citizens through technology that is easy to use and has a common feel and look. This seamlessness will carry over to state government, where future technology projects will include solutions that are uniform across all agencies and departments.

The future requires a technology vision that adapts to future challenges, a proactive rather than a reactive approach. In this strategic plan, you will read about a vision where state agencies have the ability to seamlessly share information with each other when necessary. You will find a plan that talks about uniform technology standards, policies and practices across state government. And you will learn about "enterprise solutions," a term that simply means a common approach for everything that is technology-related.

While these and other technology goals may seem complicated, they should provide simply understood enhanced services and ease of use for everyone. In today's society, technology is a given. It is our goal to ensure Vermont maintains world-class technology that betters the lives of our citizens.

Sincerely,

Denise L. Fehr

Tenus L. Fehr



EXECUTIVE SUMMARY

A compass helps guide us from one destination to another. In the same way, the State of Vermont's five-year information technology plan serves as a compass, as State government heads into a technologically more advanced future.

Vision

This trip begins with a vision. State government will identify business processes to determine which services can best be delivered with the help of technology to provide Vermonters with the most efficient and cost-effective services possible.

A Singular Focus

When it comes to technology, State government will think and act as one. It will have one driver: business processes will drive technology solutions. Most important, Vermont citizens are the sole reason State government uses technology. We will enhance delivery of services to Vermonters with technology when appropriate.

Challenges

A renewed focus and increased reliance on technology must meet a few challenges in the near-term future. Like most states, Vermont must do more with limited financial resources. Complicating the challenge, a large percentage of state workers are eligible to retire during the next decade. In the past, technology decisions within State government were decentralized, leading to potential duplication and waste. Also, many agencies and departments continue to maintain aging and obsolete systems and software.

A Guide to the Future

The Governor's Strategic Enterprise Initiative will guide the State's use of technology. For Vermonters, this will mean higher-quality and faster services, streamlined processes and a less costly government. For state employees, this will mean increased job satisfaction due to focused training, less administrative, paper-intensive processes and an improved ability to serve the public well into the future.

Success Stories

While State government plans for the future, it also claims recent information technology successes. The Agency of Transportation's Department of Motor Vehicles installed kiosks in local offices, which cut wait times for customers. The Agency of Commerce & Community Development collaborated with the Agency of Transportation and the Agency of Natural Resources to create a Geographical Information System that will be shared by multiple agencies. The State Treasurer is replacing an obsolete system to provide a more efficient and secure retirement program for state employees.

| Agency-wide | Department of Agriculture | |
|---------------------|---|--|
| Information Systems | A plan for a unified database for the entire agency including web interfaces, | |
| Upgrade | electronic payments and field data entry. | |
| SharePoint | Agency of Commerce & Community Development | |
| & Project Server | A networked service that allows for the sharing of current information | |
| - | between staff in several locations. | |
| Geographic | Agency of Commerce & Community Development | |
| Information System | A collaborative effort to create a functioning cross-agency GIS system. | |
| Screen Door System | Agency of Human Services | |
| | An initiative to provide customers and service providers easy access to | |
| | information about services and eligibility requirements. | |

| Education Data | Department of Education | | |
|-----------------------|---|--|--|
| Warehouse | A web-based information system that allows authorized users to easily | | |
| | analyze a wide range of educational data. | | |
| DMV Kiosks | Agency of Transportation/Department of Motor Vehicle (DMV) | | |
| | The kiosks allow customers to renew their automobile registrations and get | | |
| | stickers instantly and change their addresses. | | |
| Unemployment | Department of Labor | | |
| Insurance Quarterly | An Internet-based system for employers to maintain data required for | | |
| Wage and Tax Filing | quarterly reports and gross wages that calculates the tax due and initiates | | |
| | payment through an electronic transaction. | | |
| Retirement Systems | State Treasurer | | |
| Reengineering | Replacement of a 25 year old computer system to better manage state | | |
| | employee retirement program. | | |
| Security, Software, | Department of Information & Innovation | | |
| Virtual Meetings, and | Various enterprise-wide initiatives to improve communications throughout | | |
| Billing Updates | state government. | | |

Current Initiatives

Other information technology projects are in various stages of implementation and planning. A small sample includes:

| Enterprise Grants Management | This project is a common, statewide solution for the management of grants. |
|--|--|
| Enterprise Web Portal | This project will provide a common Web hosting environment for all state funded organizations. It will provide a single system to replace various independent systems currently in use, an essential step for the state toward digital government. |
| Enterprise Network Security | This project will begin the development of a self-defending network security system. |
| Enterprise Project Management Office | Provides a way for all technology projects statewide to adhere to management best practices and adopt a common best practice approach to development. |
| Enterprise Geographic Information System | A plan to bring diverse groups of GIS users together to create a common system that will support the needs of all. |
| Timekeeping and Payroll | Project to implement a technology tool to completely automate and coordinate the timekeeping and payroll processes. |
| Statewide Fiber Project | This implementation of a fiber optic infrastructure along Vermont's two major interstate highways. |
| Policies & Standards | Creation of a policy and standards committee charged with the development and enforcement of IT policies and educating users as to their proper use. |

Projects on the Horizon

Several issues have been identified that will require IT resources in the next several years. This list describes some of the more significant examples.

| Voice Over IP | A technology used to transmit voice conversations over computer networks using the Internet Protocol. There is interest in using VOIP for a centralized call center system to replace several aging systems. | |
|-------------------------------------|---|--|
| Document Management | A project to convert paper archives to electronic format. | |
| Real ID | The Federal REAL ID Act of 2005 requires the Department of Homeland Security to bring Vermont's driving licenses into compliance with the act's standards. DMV has forecast a total cost to implement Real ID in excess of \$2 million. | |
| Open Source | The CIO's Office will need to create policy specifying the correct application of this technology in the state's information technology environment. | |
| Judiciary Case Management System | A system to automate case management. This would include a Web element. | |

Charting a New Course

As Vermont faces numerous challenges over the next few years, it is our goal to make the promise of technology a reality. Technology solutions will result in greater security, privacy and convenience for Vermonters. Advanced technology and a highly trained State government workforce, when used with a common purpose and approach, will help provide Vermonters with world-class services in the most efficient way possible.



TABLE OF CONTENTS

| INTRODUCTION | 9 |
|---|----|
| Charting Your Course Through this Strategic Plan | 9 |
| VISION | 10 |
| Charting the Course for Technology's Future | 10 |
| A LAYPERSON'S GUIDE TO KEY TERMS | |
| ONE! | 12 |
| Charting the Course for | 12 |
| Technology's Future | 12 |
| CHALLENGES | 13 |
| SUCCESS STORIES | 14 |
| Strategic Enterprise Initiatives | 14 |
| Agency-Wide Information Systems Upgrade | 15 |
| SharePoint and Project Server | |
| Shared Technology to Provide Geographic Information and Mapping | 17 |
| Screen Door Initiative | |
| Education Data Warehouse (EDW) | 19 |
| Department of Motor Vehicles Kiosks | 20 |
| Unemployment Insurance Quarterly Wage & Tax Filing | 21 |
| Retirement Systems Reengineering | 22 |
| Security, Software, Virtual Meetings and Billing Upgrades | 23 |
| CURRENT INITIATIVES | |
| Enterprise Grants Management | 26 |
| Enterprise Web Portal | 27 |
| Enterprise Network Security | 28 |
| Enterprise Project Management Office | 29 |
| Enterprise Geographic Information | |
| Coordinating Timekeeping and Payroll | 32 |
| Statewide Fiber Project | 33 |
| Policies and Standards | 34 |
| PROJECTS ON THE HORIZON | 35 |
| CHARTING A NEW COURSE | 38 |
| APPENDIX | 39 |
| Statistical Information | 39 |
| Acknowledgement | 45 |

INTRODUCTION



Charting Your Course Through this Strategic Plan

n the following pages, you will read about the State of Vermont's technology vision, its core principals regarding technology, its challenges, recent successes, current initiatives, and future projects.

We have written this plan in plain English, because understanding how technology can serve all Vermonters needn't be as complicated as technology itself. The world has changed, and technology is among the greatest drivers of this change.

It is our intent to show how continued deployment of technology, when used correctly, will help meet the state's needs today and well into the future. Around the world, technology has helped improve productivity, deliver services in a time-efficient manner and helped to save precious financial resources. We should expect no less from technology used by the State of Vermont.

The success of Vermont's information technology plan depends on many players. They include the Governor and the Legislature, who oversee technology's role in government and draft laws to ensure its proper use. They include agency and department executives, the state Chief Information Officer, technology managers and the hard-working technology employees who must work together to help ensure success. And they include Vermonters – the ultimate customers – who will take advantage of advances made possible by technology. While each of these participants has different roles and responsibilities involving technology's future in the delivery of state services, collectively they are all responsible and ultimately accountable for the plan's success.

This document is not intended to provide a complete guide to technology developments in Vermont State Government. Instead this report provides detail of several projects that best represent the technology goals of the state. For further information about technology projects not detailed in this report please refer to the "Planned Information Technology Projects Detail (PlanIT)" report. You may find this online at:

http://www.dii.state.vt.us/Home/cio_central/cio_it_planning.html

VISION



Charting the Course for Technology's Future

he rapid pace of advancement in technology requires a well thought out vision for implementing technology. The State of Vermont's vision for this Five Year Plan is as follows:

As technology continues to evolve, information technology staff throughout state government will remain aware of the latest developments in order to use technology to help serve all Vermonters. We will identify those business processes which can best be delivered with the help of technology. We will adopt a holistic "enterprise approach" to guide our IT planning. Based on an analysis of business processes, we will use technology to serve Vermonters in the most efficient and cost-effective way possible. We will work together across state government to implement technology that will help to improve delivery of services.

A LAYPERSON'S GUIDE TO KEY TERMS

Enterprise: Comprises all of state government's operations.

Agency: A state organization that can include many diverse departments.

Department: Part of an agency devoted to a single mission, as opposed to an agency's many missions.

System: Typically refers to information technology hardware that is linked together such as servers, printers and workstations.

Legacy system: A previous generation of hardware and/or software; often antiquated and unsupported by vendors.

Application: Also known as software, which makes programs run on hardware.

Information system: Combines multiple applications, such as a database and payroll software.

Architecture: The design of hardware, software or a network; uses protocols and interfaces to interact with other components and provides for future flexibility and expansion.

Network: Transmits any combination of voice, data and video between users; includes hardware, such as routers and switches, and software, such as a security application.

Local Area Network (LAN): A network that permits users to communicate within a confined geographic area.

Wide Area Network (WAN): A network that permits users to communicate within a wide geographic area.

Strategic Enterprise Initiative: Governor Jim Douglas' five-year drive to transform state government; features a renewed focus on business processes and on developing enterprisewide methods for doing business.

Kiosk: A stand-alone structure that allows customers to self-serve, such as through an ATM.

ONE!



Charting the Course for Technology's Future

Our compass for tomorrow

captain uses a compass to ensure that he remains on course. In the same way, we will use the following guiding principles to ensure that technology goals become reality.

- * VERMONTERS ARE <u>THE</u> **ONE**. They are the citizen who renews a driver's license, the business owner who has questions about incorporation, the young mother who needs help to ensure her child's continued good health and the traveler who depends on fool-proof communications when a crisis occurs on our roads. They are our customers. They are Vermonters. Improving services for them is the reason why we use technology.
- * WE WILL THINK AS **ONE**. By working collaboratively, agency executives and technology managers will work together to ensure that all technology solutions work as efficiently and effectively as possible for Vermonters both today and in the future.
- * WE WILL ACT AS **ONE**. State government services are many and they are diverse. Regardless of service, the state's agencies and departments will work collaboratively and follow best practices uniform technology practices and policies to help ensure the quickest delivery of services in the most efficient and cost-effective way possible.
- * WE WILL HAVE **ONE** DRIVER. Mission based business processes will drive technology issues, not vice-versa. We will employ technology solutions when appropriate. We will evaluate business processes and consider changes, when necessary, to take advantage of technological advances.

CHALLENGES



"The ultimate measure of a man is not where he stands in moments of comfort and convenience, but where he stands at times of challenge and controversy."

(Dr. Martin Luther King Jr.)

he challenges we face involving technology may not be as daunting as those spoken about by Dr. King, but they remain challenges nevertheless. Today, the State of Vermont faces a number of challenges regarding technology:

- * Limited financial resources: Like most states, Vermont must do more with limited financial resources. Technology is one way this can be accomplished by helping to provide improved services more efficiently.
- * Fewer human resources: Efficiency will play a great role in the new future as a large percentage of State employees, including technology workers, are eligible for retirement within the next five to 10 years. The state's readiness to adapt during the coming retirement bubble will rest squarely on its ability to use technology efficiently, while training employees the state's most valuable resource for potential cross-functional opportunities and higher level work.
- * Differing practices and policies: To achieve the greatest efficiencies and cost-savings, state government must adopt a new mindset. In the past, technology decisions and purchases were decentralized. This created duplication and waste. By creating a uniform set of guidelines, policies and practices, we will eliminate duplication and waste while continuing to make decentralized decisions that are best for each agency and department.
- * Obsolete systems and software: More than any other facet of business, technology becomes outmoded quickly. Although progress has been made in replacing obsolete technology, challenges remain. We will explore all solutions, including enhancements instead of outright replacements. New purchases will have built-in "scalability," meaning systems and software in one agency may be altered, or scaled, up or down to achieve similar technology goals in other departments, saving time and considerable dollars. As technology becomes dated, we have an opportunity to create an enterprise-wide architectural framework to ensure that all technology is the right size and fit for particular needs.

SUCCESS STORIES



The following section provides information about the recent successes of several IT initiatives. Some projects have been fully realized and others, while partially realized, are still ongoing. All of these projects demonstrate the resolve of numerous individuals in bringing technology goals to fruition.

Strategic Enterprise Initiatives

Nothing less than the transformation of state government

In conjunction with the five-year information technology strategic plan, the State has undertaken the Governor's Strategic Enterprise Initiative, a five-year drive to transform state government. This effort, involving all of State government, focuses on analysis of all business processes and how they can be improved through information technology and enhanced workforce planning and training.

For Vermonters, this will mean higher-quality and faster services, streamlined processes and a less costly government. For state employees, this means increased job satisfaction due to focused training, less paperwork and an improved ability to serve the public with a staffing model that is sustainable for the long term.

The first step of the Strategic Enterprise Initiative concluded in November 2005. Each agency completed a structured survey to collect information about business processes, workforce planning and information systems.



The second step, to be completed August 31, 2006 in advance of the FY 2008 budget process, will include each agency and department submitting an initial plan that outlines their best opportunities to transform and streamline business processes. This step will also include recommendations about the necessary investments in information technology to achieve these opportunities.

Through the Strategic Enterprise Initiative, we have a unique opportunity to create a state government that provides better and faster service for our citizens, higher productivity and cost savings. We will draw on the knowledge, experience and expertise of state employees to help chart the course for the future.

Agency-Wide Information Systems Upgrade

The difference a database can make

The Problem:

An antiquated legacy system and redundant data entry tasks sapped the Agency of Agriculture, Food & Markets' technology staff of valuable time and created inefficiencies. Additionally, there were scant electronic services for Vermonters.

The Challenge:

How to automate business processes to eliminate redundancy, give Vermonters greater online access to services and allow all areas of the agency to share information efficiently.

The Solution:

After a thorough review of its business functions and technology systems, the agency completed a functional analysis and a comprehensive data model. The first webbased user registration application, using the new unified database, is nearly complete and the system can be expanded as needs dictate and resources allow.

Huge increases in efficiency are possible by automating much of the data entry from field staff and web-based user registration applications. With the unified database, an address is entered once only and is available to staff in all areas of the Agency without reentry as they work with the same client. One exciting advantage is that the system can provide information for management decisions and planning that was not readily available before. Streamlined data entry, improved search functions and links to every Agency program make the new system much more efficient and useful than the old way of doing things.

These improvements also give Vermonters online access to state services. At the same time, robust security measures protect the privacy of confidential information that is not subject to public access, while improving

continuity of government operations, even in the face of emergency or disaster.







SharePoint and Project Server

The evolution of information sharing

The Problem:

The Agency of Commerce and Community Development serves a very diverse audience, from economic development and tourism to housing and historic preservation. All of the business processes have unique needs and considerable similarities, but information sharing was limited.

The Challenge:

To create a system that would provide agency-wide structure, a means to control the outcome of individual projects and encourage collaboration.

The Solution:

The Agency implemented procedures that better accommodate development requests and track project progress. Each department must complete informational questionnaires about their potential technology projects. The forms are available in an electronic format and provided to the departments through the Agency Intranet and the use of Windows SharePoint Services.



In addition, Microsoft Project Server was added to make better use of SharePoint Services and allow for input, task

management and review of the enterprise project portfolio, including project risks, available resources and status reports.

With Windows SharePoint Services, information is captured in a database and easily reviewed and reported on. This process ensures the appropriate levels of management involvement, understanding, support and sustainability of the project. Each manager understands that technology is not a one-time event; it requires continuing support.

Windows SharePoint Services (WSS) is designed to provide document version tracking and document check-in/check-out collaboration functions. It offers a single place to share and manage all team information, such as calendars, tasks, and lists. This service keeps teams on the same page by using alerts, discussion boards, surveys, and announcements. With other Microsoft programs, SharePoint Services can link to document libraries, templates and databases to enhance cross-departmental information sharing.

Microsoft Project Server takes advantage of Windows SharePoint Services and allows for input, task management and review of enterprise project portfolios project risks available resources, and status reports. The implementation of an enterprise server also allows the use of Project Web Access, which uses the less costly Client Access License. The model creates points of project management development that allow a project manager to create the structure of the project and publish it to the web. A user who has been given rights to the project can then enter their activity and track where they are supposed to be within the project timeframe. This allows a faster response to problems if they arise and allows resources to be reallocated as necessary to assure a timely completion of the project.

Shared Technology to Provide Geographic Information and Mapping

We are stronger as ONE

The Problem:

Two departments within the Agency of Commerce and Community Development, Historic Preservation and Economic Development, needed mapping information from Geographic Information System to assist them in carrying out their missions.

The Challenge:

Finding a common approach was initiated that would meet both departments' goals without duplicating efforts, while also displaying mapping information both internally and externally.

The Solution:

A collaborative approach both within and outside the agency and the addition of customized software were added to display the information.



A year ago, the Division of Historic Preservation (HP) began work on creating GIS locatable information to identify sites of historic

worked importance. The division collaboratively with the Agency Transportation to present this information internally through specialized software and through the Geographic Information System web service. Sharing the information with the Agency of Transportation was vital because the information assists engineers as they design and redesign state infrastructures.



Additionally, Historic Preservation purchased another Environmental Systems Research Institute (ESRI) product, Spatial Database Engine (SDE). This enhancement

provided an enterprise-wide repository for data and useful analysis and guery tools. This purchase also made it possible to collaborate with the Agency of Natural Resources (ANR). agencies had similar requirements and reached an agreement to share applications that each agency needed but were lacking. The Agency of Commerce Community Development required access to an Internet Mapping Service and server that the Agency of Natural Resources had configured. and already Resources needed a server installation. The two agencies worked with the Vermont Center for Geographic Information (VCGI) to create a larger collaborative environment.

Because of this sharing environment, the Department of Economic Development is developing a web site that will provide expanded access to available development opportunities within Vermont. For example, the Regional Planning Organizations will use the technology to market their regions statewide and nationally.

Screen Door Initiative

Tomorrows tools to help today's customers

The Problem:

Customers of the Agency of Human Services had difficulty finding information about services and eligibility unless they called or visited the agency.

The Challenge:

Finding an easy-to-use alternative to help customers sort through the Agency's services with the help of online tools.

The Solution:

The Agency developed a "Screen-Door" web application that provides ease of use with the click of a mouse and a computer. This solution took advantage of existing technology.



The Agency recently underwent a major reorganization to ensure that all Vermonters understand the services available, have access to those services for which they qualify and have their needs met

through a respectful, holistic service delivery model. The creation of an online referral tool, the Screen Door, provided both customers and service providers easy access to information about the Agency's many services and eligibility requirements.

The Screen Door provides broad eligibility guidelines, program descriptions and local contact information for a wide range of health and human services programs.

The Screen Door is not intended to provide enough detail to determine eligibility for any particular program – those decisions remain the responsibility of the Agency's trained staff. However, customers enter basic information about their family and are given a list of potential services for which they may

be eligible, along with directions to receive further information by phone or in person.

For example, customers using Screen Door will also be referred to 211, a statewide number they can dial for live help about services not covered by Screen door as well as programs and resources that are available in their own community. A printable application form is also available for some services.

Because the Screen Door is on the Internet, people can use it in the privacy of their own home or anywhere there is internet access, such as the local library. The Screen Door is at www.screendoor.vermont.gov.

Education Data Warehouse (EDW)

Information sharing that improves student performance

The Problem:

Vermont's school supervisory unions lacked an efficient way to share information that helps improve student performance and meets federal and state reporting requirements.

The Challenge:

To find a way to provide information and analytical tools, while providing the highest level of security.

The Solution:



The Department of Education developed the Education Data Warehouse, a webbased information system with

advanced analytical tools and a robust security model that allows authorized users to easily analyze a wide range of data.

This project is the result of a joint effort by Vermont Department of Education and the Vermont Data Consortium, a collaborative composed of 50 percent of Vermont supervisory unions.

The Education Data Warehouse enables the Department and member school districts to pool resources to efficiently provide accurate information for improving student performance and to meet federal and state reporting requirements.

This partnership and the resulting comprehensive data warehouse are the first of its kind in the nation.

Department of Motor Vehicles Kiosks

Technology brings services closer to home

The Problem:

Customers told the Department of Motor Vehicles that two improvements they desired most were shorter wait times and more services closer to home. Expanding services such as vehicle registration to the six permanent field offices around the state would provide closer proximity, but not necessarily reduce wait times.

The Challenge:

To find a technological tool that, when combined with expansion of services to field offices, would accomplish both goals at a reasonable cost without the necessity of additional staffing.

The Solution:

The Department's 2004 strategic plan identified providing registration renewal at the permanent field offices as one of its goals. This was augmented by technology – kiosks that



allow customers to renew their registrations without standing on long lines. The result was a cost-effective way to provide enhanced customer service without the need for additional staffing, while reducing travel and wait times.

Rather than adding staff to provide this service in its field offices, the Department opted for this flexible technological solution. Self-service kiosks were identified as the best solution to meet customer's needs. The kiosks allow customers to renew their automobile registrations and receive registration stickers instantly. Customers can also file a change of address through the kiosks.

Since implementation began in March, the kiosks have processed thousands of

transactions – about 16.5 percent of all electronic transactions. These are secure transactions that customers would have completed in the past by driving to the Department's main office in Montpelier or through the mail. Best of all, this new service has not increased transaction costs for customers.

Customer surveys indicate an overwhelmingly positive response. "...This is wonderful, I am going to tell my friends about this," remarked one customer. Another said, "This was easy and fast — so much better than the mail! I love that it is instant!"

Since the kiosks' implementation, the average first-time transaction has been reduced to five minutes. Customers have the choice of using kiosks or dealing directly with a Department representative to receive services. Future plans include adding new services through the kiosks and a faster user interface.

Unemployment Insurance Quarterly Wage & Tax Filing

Reducing complexity for employers

The Problem:

The Department of Labor's unemployment insurance program has been in existence for over 70 years, and the way some tasks were performed – by paper entry – hadn't changed during that time.

The Challenge:

To find a way to reduce some time-intensive and costly tasks through the use of technology.

The Solution:

The department implemented Internet-based tools that allow customers to calculate taxes and input information while drastically reducing the costs of redundancy for both the department and employers.

One task required of employers helps illustrate the scope of the improvements made through technology. Employers who have to provide unemployment coverage to their employees must file quarterly reports with the Department of Labor. Employers have to report both individual wages paid and aggregate amounts paid, then calculate a tax that is due and remitted with each quarterly report.

These reports are required of 21,000 employers in Vermont and the responsibility to collect and process these reports four times a year is extremely labor intensive. The Department initiated the development of an online filing system that will automate most of the process. This will make it much easier for employers to meet their obligations and enable the department to process the returns more quickly.

Scheduled for implementation in mid-2006, this Internet based system will enable employers to access a secure web application that, once entered by employers,



keeps track of the names and other demographic data required on individual quarterly reports. Employers will be able to input gross

wages paid during the previous calendar quarter and the system will calculate the amount of tax due. Employers may also pay tax due through a secure automated transaction.

Simply not having to input the same demographic data and calculating the tax due each quarter will save employers a substantial amount of time each year. Because the data will be transferred electronically, the Department will save on the cost of processing payments and avoid having to reenter information that used to be provided on paper.

Retirement Systems Reengineering

Re-tooling to keep a promise

The Problem:

The number of retirees is increasing, straining the retirement systems ability to deal with the increased workload.

The Challenge:

To research and select a new computer system to replace the Office of the State Treasurer's 25-year old legacy system, while coordinating the new technology with revised business processes.

The Solution:

Working in collaboration with the Department of Information and Innovation (DII), the Office of the State Treasurer completed a business reorganization and the first stages of system reengineering. New retirement benefits and payment system modules will be phased in over the next three years.

The Office estimates that workloads will increase at a rate of 12 to 15 percent over the next several years. More than 42,000 active, vested and retired state, teachers' and municipal employees have retirement information in three systems. The key to meeting this demand was through the development of increasingly more efficient operations that are supported by newer information technology systems.



This past year, implementation of the technology phase began. Most critical to success is the partnership formed between the Treasurer's Office and the Department of Information & Innovation.

With the Department's assistance, a sophisticated and advanced project management approach has been used to develop and manage the project. The role of the project team is and will be to ensure that new systems meet the Retirement Division's needs and allow it to operate its business

efficiently and effectively. Retirement board trustees, the Department of Human Resources, the Department of Finance and Management and the Treasurer's Office Retirement Division staff have been brought into the process.

The first technology phase of converting approximately two million member documents almost 80 filing cabinets – into images, along with the implementation of an interim document management system, completed in October 2005. The acquisition of an automated pension solution for the management of the various retirement processes is now taking place. The system will be a stable, state-of-the-industry, fully integrated pension administration solution, including a tightly integrated imaging and electronic workflow capability. Web-enabled features will provide customers greater access to services.

To date, the project has met all its milestones on time, at or below budget. The Treasurer will continue to work with key business partners to bring this system online over the next three years. This effort will assist the Treasurer in continuing to deliver pensions, related benefits and services that promote financial security for retirement customers. At the same time, a growing demand and faster, simpler access to complete and accurate information for customers can be satisfied.

Security, Software, Virtual Meetings and Billing Upgrades

The Future is Now

In addition to providing information technology services, the Department of Information and Innovation acts as a technology consultant for state agencies and departments, and is responsible for the direction and oversight of all technology projects within state government. The Department recently completed a number of initiatives that will benefit all state stakeholders.

Virtual Meeting Services

The State of Vermont has several services that allow employees to communicate, meet, train and work collaboratively without requiring long trips by car or airplane. This is especially important in light of the 2006 Appropriations Act 71, which directs the Secretary of Administration to reduce operating expenses.



Using virtual communications, rather than traveling physically to a site with the resulting expense, can greatly

reduce costs. In addition, virtual meeting services are a tool that can help State employees use their time more effectively and efficiently.

Some of these services include:

Conference Calling Service

- Every telephone within the State's telephone system can conference in a total of three parties for small group conferences.
- * For larger groups, the State maintains a conference calling service with Leader Technologies. These conferences may be of almost any size, and they can be scheduled months in advance.

Vermont Interactive Television

A videoconferencing system with 14 studios statewide, Vermont Interactive Television can help state entities conduct

efficiently business more and economically. The system has been used for staff meetings, legislative updates, candidate interviews, presentations, product public hearings and demonstrations, saving state employees significant travel and reducing costs for the state.

Web Conferencing

* This Internet-based service runs on state workers' computers with the help of the software Web Conferencing. This is an inexpensive way to communicate for employees collaborating on documents. It also works well for a one-way training presentation from one instructor to multiple trainees, and it can use audio and PowerPoint-type slides when appropriate. A web video camera also shows a small window picture for employees who have a video cam on their computers.

Telephonic Interpreter Service

* This service allows State employees who receive phone calls from a non-English speaking caller to quickly conference in an interpreter to facilitate the conversation. This is a valuable service that is used real-time without previous scheduling to meet the needs of non-English speaking Vermonters.

Network Security Assessment

The need for a reliable and secure network has never been more important. The state's current network has a solid core foundation that provides secure communications, secure information-sharing and future flexibility to adapt as technology and needs change.



Despite the network's strengths, a sound approach to implementing security begins with a survey of 'critical' cyber-

assets. The Department contracted a firm to perform a comprehensive information security assessment, covering technical, administrative and physical security. This included such components as Internet, dialup and internal networks.

A result of this assessment is an improved focus on administrative security, statewide and Department policies and will include the eventual addition of technical security staff.

Wide-Area Network "Backbone" Upgrade

While the Department of Information and Innovation works to assess network security needs, it also must enhance the physical components of the wide area network to ensure continued secure communications across state departments.

A wide area network allows departments to communicate from different buildings in different cities and towns. In contrast, a local area network connects computers within a building.



Understanding that an effective network must provide a secure, coordinated approach that meets the growing communication needs of all agencies and departments, the Department initiated an upgrade

to the network "backbone". This will help ensure that the network adapts to changing requirements and supports new and emerging applications.

The "backbone" – a set of paths to which local and wide area networks connect for long distance communication – includes data switching mechanisms called routers. These and other hardware components were upgraded.

The upgrade was sorely needed. Some routers were so old that they were no longer supported by the vendor. The new routers not only provide upgraded routers but also support quality of service and provide stronger network security. They also feature options for future expansion that allow for secure connections, additional security, network analysis and intrusion detection. An added benefit is that total administration can be provided from a central location.

The network upgrade improves quality of service, reliability and security and will support voice, video, and data functions with diverse performance requirements. This allows users to perform more tasks online, such as research, collaboration, online training and surveillance security requiring video and web applications.

Additionally, state government upgrades were performed on four core campus network infrastructures in Burlington, Waterbury, Montpelier and Barre.

Switching hardware was upgraded to provide greater fault tolerance, better performance and increased infrastructure security and connectivity to each location. Additional security and trouble shooting modules were also added. Future modules can be provided as needed and the "self-defending network" can grow to meet the future needs of state government.

Internet Edge Upgrade Project



The Department of Information & Innovation also upgraded Internet-related hardware to accommodate future

information technology systems that will result from the Strategic Enterprise Initiative.

Consolidating Email Services

For years, the state's agencies and departments communicated through different email platforms with different architectures. Because of this, communicating to the state's entire workforce could not be accomplished efficiently. Calendar sharing, creating an efficient means of scheduling meetings, could not be achieved. Additional collaborative information sharing tools, such as SharePoint (sharing documents) or instant messaging could not happen across all of the various platforms. The Department of Information and Innovation has begun consolidating email systems into one, common Microsoft Exchange Platform, a task



that will conclude statewide by the spring of 2007.

"Project SEED 2007," or the Single

Enterprise Exchange Deployment, will consolidate state employees' names and email addresses from disparate platforms into one global address book. The department will manage a secure environment that also will offer value-added services to users such as document-managing, Microsoft SharePoint, Live Meeting interactive messaging and the statewide Project Management server for enhanced project status tracking.

CURRENT INITIATIVES



The following section provides information about the most recent information technology initiatives. These projects all of which are based on the "Enterprise Approach" are typically in the planning or start-up phase of implementation, and are necessary for technology to contribute to the state's success in delivering services.

Enterprise Grants Management

Standardizing processes across state government

The Problem:

Agencies across State Government manage individual based on business processes. This can lead to inconsistencies in the management and processing of grants. Manual processing of grants results in a high error rate in grant budgets and reports, but was unavoidable until recent technology developments. Additionally, the lack of a central repository of data often results in fragmented financial and program reporting. Finally, the inability to track summary program information makes it difficult to strategically manage grant dollars or report summary grant information to management.

The Challenge:



To align with the Governor's Strategic Enterprise Initiative, a single technology system must be established that is flexible enough to accommodate the needs of

a wide range of grantors across state government and serve as a central repository of grant-related information for the entire enterprise.

The Solution:

The first step involves improvement and standardization of businesses processes by state government entities that seek and manage grants. Subsequently, an IT grants management system will be put in place that meets the goals established by government stakeholders.

Numerous demonstrations of various systems that might fill this need have been held throughout the state. Diverse groups of grant-making staff have met to discuss, improve and standardize business processes across state government.

A Request for Proposals (RFP) is currently being drafted by the Department of Information and Innovation as a first step in designing a statewide process for grants processing. This RFP will include language that ensures the various grant-making standards and practices that exist throughout state government will be supported by the new system.

This is a solution that will ultimately save taxpayers money, free staff from manual administrative chores for more meaningful work and allow central oversight of all grant-making functions of the state.

Enterprise Web Portal

Vermont's Gateway to the future

The Problem:

State departments and agencies each administer their own web pages. This results in duplication of efforts, different design approaches and difficulty in navigating from one state web site to another.

The Challenge:

To coordinate all state web sites to ensure a common look, a common approach and an easy way for Vermonters to navigate multiple state web sites.

The Solution:



The State will launch a new, comprehensive web site by January 1, 2008. This state web site, known as a web portal, will embody the Governor's Strategic Enterprise

Initiative which strives to bring efficiency and standardization to common business processes within state government. Such a project also represents an opportunity to bring the state fully into the digital age.

This project is intended to benefit all state branches, partners and Vermonters. It will improve customer satisfaction and greatly reduce transaction costs.

Currently many independent systems provide the identical service for various organizations throughout state government. The web portal will provide a common solution and web hosting environment for all of state government.

Self-funded model

A method of managing state web resources, called self-funding, has become more prevalent in state government across the United States in recent years. Using this method, web technology is completely built,

housed and maintained by an independent contractor with the oversight of a state governing board. There are 20 states currently using this model that effectively responds to fiscal challenges and a desire to foster enterprise-wide, e-government growth.

In a self-funded, e-government environment, the private sector covers the cost to build, maintain, enhance and market online services on behalf of state government. Nominal fees, applied primarily to high-value services for the business community, cover both the private-sector provider's costs and improvement in the state's online services. Because the provider is paid only when services are used, the provider has a strong incentive to deploy sound marketing and communications programs to promote the availability of online services.

Enterprise Network Security

Mitigating risk through technology

The Problem:

Increased use of online technology in state government also means increased risk. One way to defend against this risk and provide a secure online environment is through what is known as self-defending network security tools.

The Challenge:

To proactively manage risk, monitor compliance and identify and mitigate evolving security threats. This project is intended to benefit all state government branches and partners as well as the citizens of the state.

The Solution:

The Department of Information & Innovation (DII) will adopt a series of technology tools that enables the network to defend itself against security attacks.



One solution, the Intrusion Detection and Intrusion Prevention Systems are network-based programs that trigger intrusion alarms. The programs use signatures to identify attacks,

perform traffic normalization, anomaly detection, protocol compliance and denial of service protection.

Additionally, network security policy and standards development tools will be the basis for evaluating and selecting other security technologies such as routers, switches and firewalls. Policy and standards will also guide development of processes and procedures. The implementation of these components will successfully protect state government's assets and interests.

Also, DII's Enterprise Network Services unit is beginning implementation of a new remote connectivity solution that will enable users to connect to the state's internal resources over the Internet. Virtual Private Network (VPN) is one component of the Department's long-term plan to improve access and increase security in this area.

Other security tools include content filtering software, which assists with performance management by regulating Internet content available to state employees and also provides protection from malicious content sent through the Internet or email.

Finally. an information technology contingency plan will include a coordinated strategy involving plans, procedures and technical measures that enable the recovery of IT systems, operations and data if a disruption should occur. Potential remedial steps can include restoring IT operations at an alternate location, recoverina operations using alternate equipment and performing some or all of the affected business processes manually over the shortterm.

Enterprise Project Management Office

Methodology across the Enterprise

The Problem:

State agencies and departments formerly managed IT development and implementation projects on their own without regard for uniform best practices across the state.

The Challenge:

To provide a mechanism by which all technology projects statewide would adhere to best practices and adopt a common approach.

The Solution:

Two years ago, the Enterprise Project Management Office was formed in DII to assist the CIO and all agencies and departments in implementing information technology project management best practices.

Successes include:

- * A uniform Request for Proposal (RFP) development process and review. The Office has reviewed more than 20 RFPs in the past year. Cross-departmental review has shown that a different perspective and experience can result in a higher-quality RFP. A library of sample documentation is available to all departments and will be available on the Project Management Office web site in early 2006.
- Project management training. Three-day classes are available that offer an overview of best practices and hands-on Microsoft Project software instruction. More than 40 state technology managers have attended the class.
- Project assistance. The Project Management Office is available to assist agencies with their projects. The office

has assisted technology managers with projects and vendor selection.

* Assistance with legislative studies. The Office has participated in legislative studies, including the municipal scanning and land commission studies, as well as a study that examined the feasibility of the Legislature adopting the new Enterprise Exchange messaging system.

Portfolio Management Tools:



A major new initiative of the Project Management Office is the development of a suite of tools to use for portfolio management. These tools will organize, manage and document the

state's information technology initiatives and provide a complete picture of individual and all projects from start to finish. They include:

PlanIT: The first enterprise information technology planning system, PlanIT was implemented in the spring of 2005 to collect and organize IT project planning data. PlanIT captures many types of data for planned, in-progress and completed projects, including projected/actual funding amounts, business objectives, project risks and drivers, project justification, technology considerations and expected RFP information. Enhancements planned for PlanIT-FY08 include enhancing the capture of business case information, costbenefit and return on investment estimates and documentation of risk mitigation strategies for the project.

- The SkillIT system was SkillIT: introduced statewide in the spring of 2005 in an effort to catalog the skills state information technology employees. This tool is available to who uses information anyone SkillIT allows users to technology. choose from many types of technical categories, including programming languages, databases. technical training and management experience. The tool rates each choice based on the employee's perceived level of experience and how critical the skill is to their job. The CIO can use this information for statewide technical training initiatives and to determine an employee's level of experience with software or individual hardware products.
- * BidIT: This tool, to be implemented in early 2006, will be used by the CIO and project management office to track RFPs and contracts through their development and bid cycles. BidIT also will have a public interface to allow departments to see where their RFP or information technology contract is in the review cycle. Implementation is scheduled for completion in 2006

- *** BuildIT:** The BuildIT system will track the progress of all major information technology systems in the state. This tool will provide a simple set of screens for project managers to the progress of major record deliverables. BuildIT will not only provide detailed project statistics, but also the means to monitor the status of major deliverables and project issues statewide. The BuildIT system is due to be implemented in 2006.
- **BuryIT:** This tool records postimplementation information into a database that tracks the lessons learned from Valuable projects. information learned by one project is not currently captured in an organized fashion, nor is it available to be shared by other projects. BuryIT would capture notes from the project team, such as what they would do again, what they would not do, what deliverable documents are available and what skills they learned. The BuryIT system also is due for a 2006 implementation.

Enterprise Geographic Information

A bold new map for statewide collaboration

The Problem:

Many agencies and departments require geographic data resources, yet they don't have the human or financial resources to acquire the resources on their own.

The Challenge:

To find a cost-efficient way for the Vermont Center for Geographic Information to collaborate with other entities statewide to provide this information in a cost-effective enterprise approach.

The Solution:

On the heels of its successful collaboration (outlined in "Successes") with the Agency for Commerce and Community Development and the Agency for Natural Resources, the Center will participate as a key provider in the design of an enterprise-wide solution.

While all participating agencies and departments will contribute aspects of their infrastructure and data resources to the enterprise, the Center is uniquely positioned to provide critical Geographic System Information-related resources and expertise. The Center's participation in the enterprise will enable other agencies to have continuous access to the state's large repository of geographic data resources.



The Vermont Center for Geographic Information will also provide Geographic System Information system design expertise and extensive data

management resources. The Center will maintain the standard for those agencies that want to participate in the enterprise. As an organization that is currently active in federal geographic data sharing partnerships with many geographic data and mapping-related professional organizations, the Center can provide extensive professional input to the development of the enterprise system.

Coordinating Timekeeping and Payroll

Saving time and effort through technology

The Problem:

The Department of Human Resources searched to find an efficient way to combine its timekeeping and payroll processes. The legacy system is labor intensive, antiquated and unsupported.

The Challenge:

To find a technology tool that would completely automate and coordinate the processes.

The Solution:

The Department adopted the PeopleSoft Time and Labor software module to automate the processes and eliminate reentry of data.



Time and Labor captures positive and exception time. processing all the time reported and appropriate applying state, legal and contractual rules. The

processed time is then loaded into the PeopleSoft Payroll module for payment. Additionally, the program has the ability for either employees or timekeepers to enter daily and weekly time, and managers and administrators can easily review, change and approve time.

The advantages of using this new software are many. It decreases paper flow by eliminating or reducing paper timesheets, gives employees the ability to directly enter their own time, decreases the chance of reporting errors, validates leaves online and has a limited availability of time reporting codes based on employee eligibility.

Statewide Fiber Project

Bringing access to remote locations

The Problem:

Vermont lacked both an adequate telecommunications infrastructure and universally accessible and affordable telecommunications throughout state.

The Challenge:

Governor Jim Douglas issued an Executive Order in 2003, mandating that state agencies address these communications deficiencies and build the infrastructure necessary that gives all citizens broadband and cell phone access, two important drivers of economic growth.

The Solution:



As a first step, with the help of \$10 million in federal funds over the next five years and close collaboration between the Agency of Transportation and the Agency of Commerce and Community

Development, a series of technology initiatives have begun that will increase affordable broadband and cell phone access, improve highway transportation and facilitate information sharing among the public and across state agencies.

To improve communication and information access along Vermont's two major highways, Interstates 89 and 91, the Department of Transportation is installing and upgrading the fiber optic infrastructure in these areas. When this fiber optic infrastructure is in place, a number of additional initiatives will be possible that will greatly improve access and safety.

Some of these initiatives include:

- Road-weather condition information systems;
- ★ Variable message signs;

- ★ Low power FM;
- * Highway advisory radio stations; and
- * Bridge sensors with de-icing technologies.

These state-of-the-art additions and enhancement will greatly improve information about road conditions, alerting motorists about hazardous conditions and instantaneously providing the Department of Transportation with information about areas that need immediate attention. For example, the Department can control overtime costs by using targeted weather communication to salt and de-ice roads when needed most.

Once fully realized, the system will provide greater cell phone and broadband access and increase efficiencies in state government, resulting in tax savings for all citizens.

Policies and Standards

Uniformity across state government

A strategic plan and implementation of a plan's components are only as good as the policies and standards that guide them. If we are to think about technology as ONE state, act as ONE state and advance technological offerings as ONE state, ONE set of policies and standards must help us chart our course.

The creation and adoption of Vermont's technology policies and standards is a team effort. The State Technology Collaborative Committee worked with the Office of the CIO to establish uniform policies and standards for passwords and malicious software



protection. A web task force created standards that establish a common look, feel and methodology for the state's various web sites. The department of

Human Resources was consulted and these standards were approved by the State Technology Collaborative Committee and the Secretary of Administration.

Additionally, other policies and standards will:

- Establish a state-wide approach to information security and privacy;
- Prescribe mechanisms that help identify and prevent the compromise of information security and misuse of the state's data, applications, networks and computer systems;
- Define mechanisms that protect the reputation of the State of Vermont and allow the State to satisfy its legal and ethical responsibilities with regard to its networks' and computer systems' connectivity to worldwide networks.

PROJECTS ON THE HORIZON



Information technology is always changing. Because a strategic plan is a living document, there will always be new initiatives to achieve current and new business goals. These are the newest initiatives on the horizon.

Voice over IP (VoIP)



Voice Over Internet Protocol (VOIP) is a relatively new technology that transmits voice as

"data packets" across both local and wide area networks like GovNet. The Department of Information and Innovation has begun the process of analyzing what needs to occur both at the local area and wide area network level to enable state government to take advantage of opportunities to use VOIP in the future.

An upgrade of the wide area network (described in "Successes"), will include staging for the VOIP technology. The final result will be a network equipped with "Quality of Service" technology that allows the network to carry time-sensitive data such as voice and video.

The Department will review the present telecommunications needs of the state and the present state of local area networks supported by each agency and department. This study will conclude with options and recommendations for entities across the entire state enterprise on VOIP.

Document Management

Managing documents in an efficient manner requires computer programs, scanners, printers and storage solutions. Electronic document management allows an enterprise and its users to create a document or capture an image, then store, edit, print and manage the document.



The state is moving toward moving all its documents from paper into electronic storage, a process called

document imaging. This facilitates faster retrieval of records, enhanced security of records, disaster recovery capabilities, improved customer service and enhanced productivity. Document management in electronic form provides a central depository for all records reduces paper and saves on time and labor over the long term.

Real ID

The REAL ID Act of 2005 gives the Department of Homeland Security authority to require states to rapidly implement new regulations for State driver's license and identification document security standards. The Act improves the integrity of the driver's

license by establishing minimum standards for state-issued driver's licenses and ID's.

The Department of Motor Vehicles will be required to implement the following new standards by May 2008:

- Mandatory photo licenses for everyone.
- Verification of all source documents used to prove one's identity, including birth certificates, social security cards or any immigrationrelated document used to prove legal presence in the United States.
- Redesign of the driver's license document itself.
- * The capability to capture, store and electronically transfer the digital images of source documents.
- * The ability to ensure the physical security of all locations where licenses and ID's are produced.



Implementation of these provisions will require a sizeable investment by the states, since the Act itself

was passed without federal funding attached. Additionally, the verification procedures required will take not only money to develop the necessary systems, but will also affect the service provided to DMV's customers. In many cases individuals seeking a driver license or ID may not be able to complete that service on their initial trip to a Department of Motor Vehicle office.

The federal rules specifying all the details necessary to carry out the provisions of this Act have yet to be finalized. However, based on a preliminary review of the Act's general provisions, the Department has forecast a total cost in excess of \$2 million to implement the new rules.

Open Source

The Open Source operating system and software solution offer an alternative to



traditional propriety software packages, such as Microsoft Windows. A major benefit of using Open

Source is that it requires no licensing fee. There may, however, be hidden costs in the use of Open Source programs, including compatibility with other software, retraining of staff and contractors and lack of centralized support.

Nevertheless, the use of Open Source software has the potential to save the state a considerable sum by reducing or eliminating per-user licenses for workstations and laptops, as well as licensing fees for server based software.

A few State entities are currently using this software model in limited instances. The State will need to explore the appropriateness of this software model on a case-by-case basis to see if statewide adoption for a particular application would provide a financial benefit to the people of Vermont.

Before use of Open Source becomes ubiauitous. best practices must be developed for its use. Once ramifications of using Open Source software have been determined, the CIO's Office will policy specifying the application of this technology in the state's information technology environment.

Judiciary Case Management System



In 2004, the Legislature appropriated \$60,000 to the Judiciary to study the need for a new automated case management system. The study found that a

new system would allow the Judiciary to enable citizens' online access to services, tailor production of accounting information to meet reporting requirements, allow litigants to electronically file cases or pay obligations, enable the courts to electronically store documents and ensure proper support for upgrades and maintenance.

Additionally, a new system would improve the accuracy of information and provide agencies that work with the courts access to information needed to supervise cases within the system. All of this would help reduce paper storage and save taxpayer dollars.

Judiciary published a Request for Information for pricing and project

specifications for the case management system. The Department of Information and Innovation collaborated with Judiciary to review the proposals. Once reviewed, the Judiciary will prepare a Request for Proposal, reviews bids and award a contract. It will also hire a project manager to guide implementation and be a liaison with the selected vendors.

CHARTING A NEW COURSE

Time stands still for no person, an adage that is particularly true when it comes to information technology. As Vermont, like many states, faces numerous challenges over the next few years, it is our goal to make the promise of technology a reality.

When deployed properly using a common enterprise-wide approach, technology can foster



greater productivity, efficiency and eventual cost-savings. Technology solutions can facilitate greater security, privacy and convenience for the state's most important stakeholders – its citizens. However it is also true that the most advanced technology in the world is only as good as the human effort that is put into it. Therefore workforce development, training, recruitment, and recognition will play a vital role in ensuring the State achieves its technology goals through its highly skilled IT workforce.

With this combination of a top-notch information technology workforce and appropriate technology solutions, we will provide Vermonters with world-class service. Nothing less will do.

APPENDIX

Statistical Information



Ogranizational IT Expenditures Fiscal Year 2004 - 2005

Data for the following was derived from the report, "State of Vermont Technology Expenses, Business Unit Account Detail by Year for Fiscal years 2002-2005 and 2006 through October 2006" presented by the Department of Finance and Management.

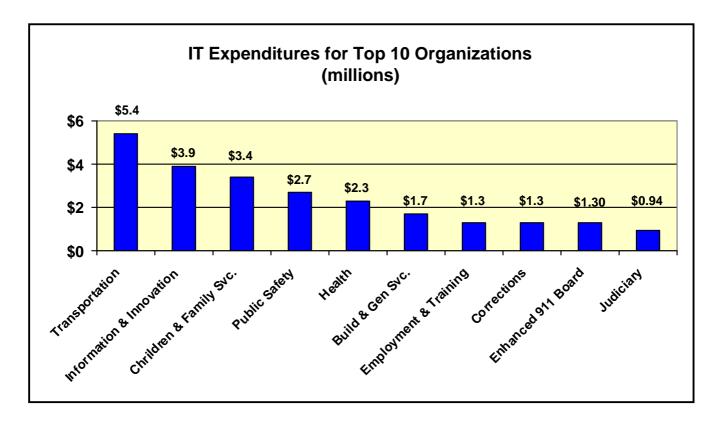
| BU | AGENCY / DEPARTMENT | FY 2004 | FY 2005 |
|-------|-------------------------------------|----------------|----------------|
| 01100 | Agency of Administration Sec Office | \$6,524.84 | \$7,445.75 |
| 01105 | Information & Innovation | \$3,416,580.89 | \$3,876,045.53 |
| 01110 | Finance & Management | \$15,734.43 | \$406,455.53 |
| 01115 | F & M – Financial Management Sys | \$909,891.90 | \$935,903.26 |
| 01120 | Personnel – Governmental | \$973,682.58 | \$330,030.41 |
| 01125 | Personnel – Proprietary | \$269,712.39 | \$312,157.73 |
| 01130 | Libraries | \$499,955.85 | \$587,809.49 |
| 01140 | Tax | \$926,524.04 | \$804,726.14 |
| 01150 | Buildings & Gen Serv-Gov'tal | \$411,976.39 | \$409,632.08 |
| 01160 | Buildings & Gen Serv-Prop | \$1,370,713.10 | \$1,718,097.50 |
| 01180 | Buildings & Gen Serv-Capital | \$59,269.16 | \$201,873.52 |
| 01200 | Executive Office | \$35,272.09 | \$41,872.76 |
| 01210 | Legislative Council | \$282,986.38 | \$360,098.30 |
| 01220 | Joint Fiscal Office | \$2,303.00 | \$5,765.74 |
| 01230 | Sergeant of Arms | \$12,523.71 | \$7,540.97 |
| 01240 | Lieutenant Governor | \$7,407.04 | \$2,607.68 |
| 01250 | Auditor of Accounts – Gov'tal | \$25,626.05 | \$29,272.49 |
| 01260 | State Treasurer – Gov'tal | \$139,329.67 | \$130,007.41 |
| 01265 | State Treasurer - Fiduciary | \$65,133.31 | \$71,369.03 |
| 01270 | State Labor Relations Board | \$4,346.71 | \$7,133.49 |
| 01280 | VOSHA Review Board | \$1,265.04 | \$1,159.66 |
| 01290 | Unorganized Towns & Gores | \$1,390.11 | \$0 |
| 02100 | Office of the Attorney General | \$144,946.24 | \$160,524.99 |
| 02110 | Office of the Defender General | \$94,891.86 | \$111,749.04 |
| 02120 | Judiciary | \$855,367.64 | \$938,788.81 |
| 02130 | State's Attorneys and Sheriffs | \$433,094.72 | \$271,136.46 |
| 02140 | Public Safety | \$2,755,422.68 | \$2,716,820.55 |
| 02150 | Military Department | \$122,119.26 | \$98,396.12 |
| 02160 | Center for Crime Victim's Serv | \$24,236.20 | \$26,465.28 |
| 02170 | Criminal Justice Trng Council | \$64,352.94 | \$88,559.08 |
| 02180 | Fire Service Training Council | \$47,553.40 | \$67,059.99 |
| 02200 | Agriculture, Food & Markets | \$197,775.86 | \$197,765.71 |
| 02210 | Banking Ins Sec Hlth Care Adm | \$238,086.60 | \$300,525.23 |
| 02220 | Labor & Industry | \$267,185.38 | \$231,980.57 |
| 02230 | Secretary of State | \$653,012.87 | \$125,585.14 |
| 02240 | Public Service Department | \$60,125.41 | \$76,944.41 |
| 02250 | Public Service Board | \$74,147.61 | \$50,708.33 |
| 02260 | Enhanced 911 Board | \$194,519.88 | \$1,270,407.71 |
| 02270 | Vermont Racing Commission | \$1,911.75 | \$2,895.13 |
| 02280 | Human Rights Commission | \$5,505.83 | \$6,648.54 |
| 02300 | Liquor Control | \$173,937.23 | \$150,282.30 |
| 02310 | Vermont Lottery Commission | \$64,582.70 | \$64,982.88 |
| 03100 | Human Services Central Office | \$151,359.74 | \$0 |
| 03110 | Child Support Services Office | \$993,691.55 | \$0 |
| 03120 | Department of Health | \$1,688,073.85 | \$0 |
| 03130 | Social & Rehabilitation Serv | \$1,244,599.85 | \$0 |
| 03140 | Prev Assist Trans Hlth Acc | \$1,166,962.82 | \$0 |

| BU | AGENCY / DEPARTMENT | FY 2004 | FY 2005 |
|-------|--------------------------------|-----------------|-----------------|
| 03150 | Dev & Mental Hlth Services | \$406,291.05 | \$0 |
| 03160 | Aging and Disabilities | \$423,193.79 | \$0 |
| 03170 | St Economic Opportunity Office | \$18,025.08 | \$0 |
| 03180 | Corrections | \$1,329,785.55 | \$0 |
| 03275 | VT Correctional Industries | \$35,120.44 | \$0 |
| 03300 | Vermont Veterans' Home | \$198,447.71 | \$208,205.19 |
| 03310 | Governor's Commission on Women | \$8,250.19 | \$8,596.75 |
| 03400 | Human Services Central Office | \$0 | \$187,208.78 |
| 03410 | Office of Health Access | \$0 | \$486,519.83 |
| 03420 | Health | \$0 | \$2,281,736.33 |
| 03440 | Children and Family Services | \$0 | \$3,430,750.16 |
| 03460 | Aging and Independent Living | \$0 | \$611,981.24 |
| 03480 | Corrections | \$0 | \$1,270,952.62 |
| 03675 | VT Offender Work Program | \$0 | \$59,584.51 |
| 04100 | Employment & Training | \$1,993,278.88 | \$1,340,750.66 |
| 05100 | Education | \$400,151.76 | \$851,979.23 |
| 06100 | Natural Res Central Office | \$342,858.04 | \$441,887.83 |
| 06120 | Fish & Wildlife | \$367,655.77 | \$419,561.68 |
| 06130 | Forest, Parks & Recreation | \$319,702.16 | \$376,189.69 |
| 06140 | Environmental Conservation | \$473,282.77 | \$531,785.15 |
| 06210 | Environmental Board | \$37,510.01 | \$29,731.86 |
| 06220 | Water Resource Board | \$2,675.44 | \$2,777.59 |
| 07100 | Commerce & Community Dev Admin | \$51,448.25 | \$103,610.36 |
| 07110 | Housing & Comm Affairs | \$59,276.68 | \$103,131.59 |
| 07120 | Economic Development | \$82,506.16 | \$172,119.92 |
| 07130 | Tourism & Marketing | \$359,965.39 | \$160,307.46 |
| 07150 | Vermont Life | \$52,599.32 | \$48,847.53 |
| 08100 | Agency of Transportation | \$5,897,718.60 | \$5,408,508.71 |
| 08110 | AOT Proprietary Funds | \$540,928.18 | \$422,389.42 |
| | Grand Total | \$34,556,283.77 | \$36,164,344.83 |

Gartner offers the following guidelines when interpreting their data. ""Typically, state governments spend between 6 percent and 7 percent of their total operating budgets — or \$7,000 to \$8,000 per employee — on IT. The percentage of IT employees in such entities is usually 7 percent to 8 percent of the total employee population."

Organizational IT Expenditures

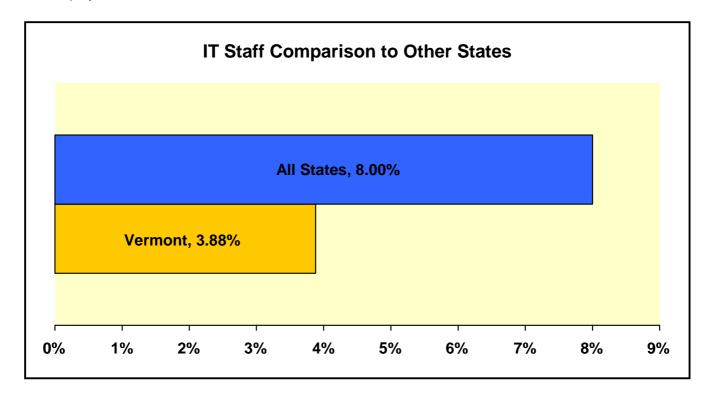
Data for the following chart was derived from the report, "State of Vermont Technology Expenses, Business Unit Account Detail by Year for Fiscal years 2002-2005 and 2006 through October 2006" presented by the Department of Finance and Management.



IT Staffing Information by Organization

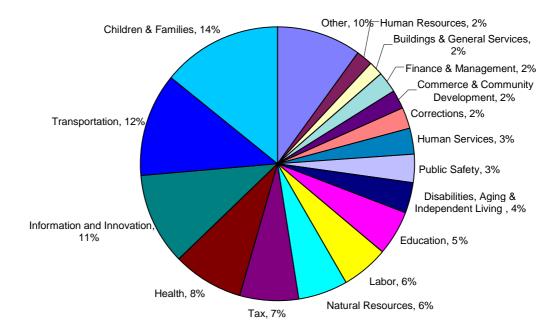
The "All States" bar line on the graph represents IT staffing data provided by Gartner, Inc. The information presented was derived from the "U.S. IT Spending and Staffing Survey, 2005" Publication Date: 2 November 2005/ID Number: G00132173 Page 9 &10 of 73 © 2005 Gartner, Inc. and/or its Affiliates. All Rights Reserved.

The "Vermont" bar line on the graph represents the percentage of IT staff within state government. This data was provided by the Department Of Human Resources in their report to DII titled "Filled IT Positions in State Government as of December 8, 2005 Pay Date." Total IT staff count for the State of Vermont as of December 8, 2005 is 336 employees. Total state employees count for the State of Vermont as of December 8, 2005 is 8,641.



IT Staff Percentages by Organization

Data for the following chart was provided by the Department Of Human Resources in their report to DII titled "Filled IT Positions in State Government as of December 8, 2005 Pay Date".



Acknowledgement

The content of this information technology strategic plan is a credit to all of the dedicated and talented individuals who are focused on bringing e-government services to our fellow Vermonters. We would like to acknowledge the vision and leadership provided by the Governor through his Strategic Enterprise Initiative. We thank our executive leadership for joining us on this journey to identify technology opportunities that will benefit our citizens and help the state achieve its business objectives. We acknowledge our legislators who support and understand the need for building a strong technology base. Finally, we thank and acknowledge the many dedicated employees throughout state government who will work together to make our technology vision a reality.

Questions, Comments or Additional Copies

Should you have any questions or comments regarding this plan, or desire additional copies, or you would like a copy of the Planned Information Technology Project Detail Report (PlanIT Report).

Please contact:

Rita Rounds
Department of Information & Innovation
Telephone: 802-828-4141
E-mail: rita.rounds@state.vt.us

These reports may be found at the website listed below:

Website: http://www.dii.state.vt.us/Home/cio_central/cio_it_planning.html